

REMARKS

Reconsideration of the claims and reexamination of the application are respectfully requested.

Claims 1, 3-8, and 26-30 are rejected. New claims 31-37 are added by amendment herein. Thus, claims 1, 3-8, and 26-37 are pending. The new claims are fully supported by the application as filed and do not add new matter.

Claims 1, 4, 6-8, 31, and 32 Are Not Anticipated by Yeda

The Office has maintained the rejection of claims 1, 4, and 6-8, under 35 U.S.C. § 102(b), as allegedly anticipated by Yeda, for the reasons of record in the Office Action dated August 24, 2004. (Office Action at Item 4.) In the August 24, 2004, Office Action, the Office stated that at pages 12 and 13 Yeda disclose treatment of disorders linked to pathological processes involving induction of TNF- α secretion. (August 24, 2004, Office Action at Item 8.) The Office also listed disorders specifically recited in Yeda. (*Id.*) Applicants note that none of the disorders recited in claims 1, 4, and 6-8 is included in that list.

As stated by Applicants in their response filed January 26, 2005, Yeda does not disclose a method of treating any of the disorders recited in Applicants' claims. Thus, Yeda does not anticipate any of Applicants' claims. See *Verdegaal Bros. v. Union Oil Co.*, 814 F.2d 628, 631, 2 U.S.P.Q.2d 1051, 1053 (Fed. Cir. 1987); M.P.E.P. § 2131.

Applicants position is simple: Yeda does not disclose treatment of any of the conditions recited in the pending claims and for this reason Yeda does not disclose the methods claimed by Applicants. The Office has not rebutted this position by pointing to

any disclosure in Yeda of use of enoxaparin to treat the conditions recited in Applicants' claims. Accordingly, Applicants respectfully request that this rejection be withdrawn.

Applicants note that new claims 31 and 32 depend from claim 1. Claim 31 recites "The method of claim 1, wherein a wound healing disturbance is treated," and claim 32 recites "The method of claim 1, wherein a disorder of the locomotor system is treated." Applicants submit that Yeda does not disclose a method of treating either a wound healing disturbance or a disorder of the locomotor system. Thus, these claims are also novel over Yeda.

Claims 3, 5, 26-31, and 33-37 Are Nonobvious

The Office rejected claims 3, 5, and 26-30 as allegedly obvious under 35 U.S.C. § 103(a), over Yeda and Claiborne in combination. (Office Action at Item 12.) The Office contends that Yeda teaches the treatment of pathological processes involving the induction of TNF- α secretion using a pharmaceutically acceptable carrier and a low molecular weight heparin. (*Id.*) The Office acknowledges that Yeda differs from the rejected claims in that Yeda does not explicitly teach the treatment of the conditions recited by the rejected claims. (*Id.*) However, the Office contends that these deficiencies of Yeda are remedied by Claiborne, which allegedly teaches that excessive or unregulated TNF production or activity has been implicated in mediating or exacerbating a laundry list of conditions. (*Id.*) Applicants traverse this rejection.

When rejecting a claim under 35 U.S.C. § 103(a), the Office bears the burden of making out a case of *prime facie* obviousness. A *prima facie* case of obviousness requires the Office to cite to a reference or combination of references that (a) discloses all the elements of the claimed invention, (b) suggests or motivates one of skill in the art

to combine or modify those elements to yield the claimed combination, and (c) provides a reasonable expectation of success should the claimed combination be carried out (See, e.g., *Northern Telecom Inc. v. Datapoint Corp.*, 908 F.2d 931, 934 (Fed. Cir. 1990); *In re Dow Chem. Co.*, 837 F.2d 469, 473 (Fed. Cir. 1988)).

Failure to establish **any one** of those three requirements precludes a finding of a *prima facie* case and, without more, precludes a rejection of the claims under § 103. As stated in *Dow Chem.*, 837 F.2d at 473:

The consistent criterion for determination of obviousness is whether the prior art would have suggested to one of ordinary skill in the art that this process should be carried out and would have a reasonable likelihood of success, viewed in the light of the prior art Both the suggestion and the expectation of success must be founded in the prior art, not in the applicant's disclosure.

(citations omitted.)

Thus, beyond looking to the prior art to determine if it suggests doing what the inventor has done, one must also consider if the art provides the required expectation of succeeding in that endeavor. See *Dow Chem.*, 837 F.2d at 473 (“Both the suggestion and the expectation of success must be founded in the prior art, not in applicant's disclosure.”).

Applicants submit that the combination of Yeda with Claiborne fails to provide one of skill in the art with either a motivation to combine the references to arrive at Applicants' claims or a reasonable expectation of success that enoxaparin can be used to treat the specific conditions recited in Applicants' claims. For each of these reasons, the Office has not met its burden of establishing that the claims are *prime facie* obvious and the rejection for obviousness should be withdrawn.

Claiborne is concerned with a large genus of organic molecules. Claiborne states that these molecules can be used "in the prophylactic or therapeutic treatment of disease states in mammals which are exacerbated or caused by excessive or unregulated cytokines, e.g., IL-1, IL-6, IL-8 or TNF." (Claiborne at col. 10, lines 59-62.) Claiborne then states that "Because the compounds of formula I inhibit cytokines, the compounds are useful for treating diseases in which cytokine presence or activity is implicated, such as rheumatoid arthritis, rheumatoid spondylitis, osteoarthritis, gouty arthritis and other arthritic conditions." (Claiborne at col. 10, lines 63-67.) With respect to TNF, Claiborne then provides a list of disease states allegedly mediated by excessive or unregulated TNF production or activity. (Col. 11, lines 1-15.) The **only** disorder recited in Applicants' claims that is included in this list is myalgia. Interestingly, Claiborne further states that the compounds described therein are useful to treat inflammation, such as that in various forms of arthritis. (Col. 11, lines 12-23.) Claiborne does not include these conditions among those described as mediated by TNF production or activity. By implication, Claiborne is conveying that these conditions are not mediated by TNF.

The examples in Claiborne are all concerned with synthesis of various exemplary compounds. Finally, at columns 23-25, Claiborne prophetically describes biological assays that could be performed with the compounds, but which apparently have not been performed. Claiborne does not show what the results of these assays might be.

It is apparently the Office's contention that these disclosures of Claiborne would have led one of skill in the art to treat the conditions recited in Applicants' claims with enoxaparin. Applicants disagree. Specifically, Claiborne would have neither provided

one of skill in the art with the motivation to do so or with the with the requisite expectation of success that enoxaparin could be used to treat the conditions recited by Applicants' claims.

As described above, with one exception Claiborne does not associate the disorders recited in Applicants' claims with TNF. Thus, Claiborne does not suggest in any way that the teachings of Yeda, limited to TNF-related disorders, should be applied to the disorders recited in Applicants' claims. Therefore, Claiborne does not provide a motivation to combine these references and Yeda and Claiborne do not render the claims obvious for this reason.

Yeda and Claiborne do not render the pending claims obvious for the further reason that the two references provide no reasonable expectation of success in carrying out the methods claimed by Applicants. While Claiborne alleges that the compounds disclosed therein can be used to treat a vast array of conditions, Claiborne only suggests that inhibition of TNF is a beneficial aspect of the treatment of a small subset of the disclosed conditions. Thus, even if Yeda teaches that low molecular weight heparin has effects on TNF production, one of skill, reading Claiborne, would not expect success in using enoxaparin to treat the conditions described in Claiborne. Thus, Yeda and Claiborne at most provide an invitation to experiment with enoxaparin, which is not sufficient to establish the prime facie obviousness of Applicants' claims.

Regarding osteoarthritis, Applicants wish to emphasize that Claiborne nowhere associates osteoarthritis with TNF. At column 11 Claiborne associates certain conditions with TNF, at lines 1-15; and associates certain other conditions, including

osteoarthritis, with inflammation, at lines 16-23. These groups are distinct. Thus Claiborne most certainly does not teach treating osteoarthritis by inhibiting TNF.

New claims 33-37 recite "The method of claim 3, wherein osteoarthroses is treated" (claim 33); "The method of claim 3, wherein spondyloses is treated" (claim 34); "The method of claim 3, wherein chondrolysis is treated" (claim 35); "The method of claim 3, wherein collagenoses is treated" (claim 36); and "The method of claim 3, wherein arthropathies are treated" (claim 37). None of these disorders is recited in Yeda. Claiborne does not disclose that any of these disorders involve secretion of TNF. Yeda and Claiborne neither teach nor suggest these claimed methods. Thus, claims 33-37 are nonobvious over Yeda and Claiborne.

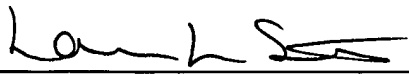
Conclusion

In view of the foregoing amendments and remarks, Applicants respectfully request reconsideration and reexamination of this application and the timely allowance of the pending claims.

Please grant any extensions of time required to enter this response and charge any additional required fees to our Deposit Account No. 06-0916.

Respectfully submitted,

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